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| 10/572,900 | 03/21/2006 | Alfred Boucek | 2003P14866WOUS | 2994 | |
| 22116 SIEMENS CO | 7590 12/10/200° RPORATION | 7 | EXAMINER | | |
| INTELLECTUAL PROPERTY DEPARTMENT | | | TABOR, AMARE F | | |
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

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| | Application No. | Applicant(s) | — <i>(()</i> /~ |
| | 10/572,900 | BOUCEK ET AL. | |
| Office Action Summary | Examiner | Art Unit | |
| | Amare Tabor | 2139 | |
| The MAILING DATE of this communication app | ears on the cover sheet with the c | orrespondence address | |
| Period for Reply A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). | ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim will apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE | N. nely filed the mailing date of this communicati D (35 U.S.C. § 133). | |
| Status | | | |
| 1)⊠ Responsive to communication(s) filed on 21 M | arch 2006. | | |
| | action is non-final. | | |
| 3) Since this application is in condition for allowar closed in accordance with the practice under E | · · | | is |
| Disposition of Claims | | | |
| 4) Claim(s) 12-26 is/are pending in the application 4a) Of the above claim(s) is/are withdray 5) Claim(s) is/are allowed. 6) Claim(s) 12-26 is/are rejected. 7) Claim(s) is/are objected to. 8) Claim(s) are subject to restriction and/or | vn from consideration. | | |
| Application Papers | | | |
| 9)☐ The specification is objected to by the Examine | г. | | |
| 10) The drawing(s) filed on is/are: a) acce | epted or b) objected to by the | Examiner. | |
| Applicant may not request that any objection to the | = ' ' | | |
| Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex | • | - | |
| Priority under 35 U.S.C. § 119 | | | |
| 12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority document: 2. Certified copies of the priority document: 3. Copies of the certified copies of the priority application from the International Bureau * See the attached detailed Office action for a list | s have been received. s have been received in Applicati rity documents have been receive u (PCT Rule 17.2(a)). | ion No ed in this National Stage | |
| Attachment(s) 1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 03/21/2006 and 06/05/2006. | 4) Interview Summary Paper No(s)/Mail D 5) Notice of Informal F 6) Other: | ate | |

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DETAILED ACTION

- 1. In the amendment filed on 03/21/2006, Applicant cancelled Claims 1-11.
- 2. New claims 12-26 are added.
- 3. Claims 1-26 are examined.

Priority

4. Acknowledgment is made of applicant's claim for foreign priority under 35 U.S.C. 119(a)-(d). The certified copy has been filed in parent Application No. 10/579,200, filed on 03/21/2006.

Claim Rejections - 35 USC § 112

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 12, 19 and 25 rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 12, 19 and 25 include the limitation "PPPoE transmission method and in accordance with RFC 2516." As disclosed in the background of the invention, PPPoE (Point to Point Protocol over the Ethernet) is a <u>network protocol</u> defined in RFC 2516 <u>specification</u> that allows computers to connect to a network, or Internet, via a shared modem. The computers connect to the modem via a LAN such as Ethernet and the modem connects to an ISP via a serial connection such as PPP over ADSL. Furthermore, Ethernet is a standard (standardized as IEEE 802.3) that defines a number of wiring and signaling standards for the OSI physical layer.

It is not clear from the claim language if the claimed invention is claiming protocols, standards and specifications. Therefore, the independent claims and their respective dependent claims of the invention are rejected as being indefinite and/or unclear.

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Claim Rejections - 35 USC § 103

- 6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 12-26 are rejected under 35 U.S.C. 103(a) as being unpatentable over "Yoshimoto" (US 6,237,023 B1) in view of Senapati et al. (US, 2003/0041151 A1 referred as "Senapati" hereinafter).

As per Claim 12, Yoshimoto teaches,

A method for performing data transmission via a subscriber's connection located in a communication network (see *abstract*; and for example, column 1, lines 8-11) which is in accordance with Ethernet (see *Fig. 1*; and for example, column 3, line 39 to column 4, line 11; *the computer network includes Ethernet*) transmission method, comprising (see column 2, lines 23-58):

having a connection data that represents the subscriber's connection (see steps S201 & S301 in Fig. 2-3; where terminal identifier is acquired)

transmitting the messages to the communication network via the subscriber's connection (see Fig. 1-5; and abstract; service request is transmitted to the server from client computers);

and authenticating the data to be transmitted by using the connection data which is contained in messages (see steps S203-204, S303-304, S402-403 and S502-503 in Fig. 2-5; where the service request is authenticated).

Yoshimoto fails to teach, transmitting the connection data and data to be transmitted via the subscriber's connection in accordance with PPPoE transmission method and in accordance with RFC 2516; and inserting the connection data as "Relay Session ID TAG" into PPPoE Active Discovery messages. However, in the same field of endeavor, Senapati teaches transmitting in accordance with PPPoE transmission method and in accordance with RFC 2516 (see *Fig. 1-2; abstract*; and for example, paragraph [0001], [0024] to [0026]) by inserting the data as "Relay Session ID TAG" into PPPoE Active Discovery messages (see *Modem 104* in *Fig. 1-2;* and for example, paragraphs [0047] and [0063] to [0071]).

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It would have been obvious to a person having ordinary skill in the art at the time of Applicant's invention to combine the teachings of Senapati and Yoshimoto because the both inventions method of authenticating data transmission using password and identifier information. One having ordinary skill in the art would be motivated to incorporate the PPPoE feature of Senapati in to the data transmission authentication method of Yoshimoto in order to improve the data transmission process of DSL service (see Background of Senapati).

As per Claims 19, 21 and 22, Yoshimoto teaches,

A communication system (see column 1, line 59 to column 2, line 22) for performing data transmission via a subscriber's connection located in a communication network which is in accordance with Ethernet transmission method (see *Fig 1; and abstract*), comprising:

a connection data that represents a subscriber's connecting line that is connected to the subscriber's connection (see Fig. 6-7; where connection data is disclosed);

a transmitter that transmits the connection data to the communication network via the subscriber's connection (see *server 102* and *clients 103, 105 & 106* in *Fig. 1*);

and an authenticator (see AUTHENTICATION SERVER 104 in Fig. 1) located in the communication network that verifies authenticity of data to be transmitted via the subscriber's connecting line by using the connection data (see *network cable 101 in Fig. 1*; where clients 103, 105 & 106 are connected to the verifying server 104 and server 102).

Yoshimoto fails to teach, transmitting the connection data and data to be transmitted via the subscriber's connection in accordance with PPPoE transmission method and in accordance with RFC 2516 (see *Fig. 1-2; abstract*; and for example, paragraph [0001] and [0027] to [0029]); and inserting the connection data as "Relay Session ID TAG" into PPPoE Active Discovery messages. However, Senapati teaches transmitting in accordance with PPPoE transmission method and in accordance with RFC 2516 by inserting the data as "Relay Session ID TAG" into PPPoE Active Discovery messages (see *Modem 104* in *Fig. 1-2;* and for example, paragraphs [0047] and [0063] to [0071])...

It would have been obvious to a person having ordinary skill in the art at the time of Applicant's invention to incorporate the PPPoE feature of Senapati in to the data transmission method of Yoshimoto in order to improve the integrity of data by authenticating subscribers using user identifier information of the client computer.

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As per Claim 25, Yoshimoto teaches,

A communication device (see column 1, line 59 to column 2, line 22) for a communication system for performing data transmission via a subscriber's connection located in a communication network which is in accordance with Ethernet transmission method(see *Fig 1; and abstract*), comprising:

a connection data that represents a subscriber's connecting line that is connected to the subscriber's connection (see Fig. 6-7; where connection data is disclosed);

a transmitter that is allocated to the communication device and transmits the connection data to the communication network via the subscriber's connection (see *server 102* and *clients 103, 105 & 106* in Fig. 1);

and an authenticator (see AUTHENTICATION SERVER 104 in Fig. 1) located in the communication network that verifies authenticity of data to be transmitted via the subscriber's connecting line by using the connection data (see line 101 in Fig. 1; where clients 103, 105 & 106 are connected to the verifying server 104).

Yoshimoto fails to teach, transmitting the connection data and data to be transmitted via the subscriber's connection in accordance with PPPoE transmission method and in accordance with RFC 2516 (see *Fig. 1-2; abstract*; and for example, paragraph [0001] and [0027] to [0029]); and inserting the connection data as "Relay Session ID TAG" into PPPoE Active Discovery messages. However, Senapati teaches transmitting in accordance with PPPoE transmission method and in accordance with RFC 2516 by inserting the data as "Relay Session ID TAG" into PPPoE Active Discovery messages (see *Modem 104* in *Fig. 1-2*; and for example, paragraphs {0047] and [0063] to [0071]).

It would have been obvious to a person having ordinary skill in the art at the time of Applicant's invention to incorporate the PPPoE feature of Senapati in to the data transmission method of Yoshimoto in order to improve the integrity of data by authenticating subscribers using user identifier information.

As per Claim 13 and 23, Yoshimoto teaches,

wherein the connection data is a port identification or PORT-ID and represents a subscriber connecting line that is connected to the subscriber's connection (see Fig. 3; where connection is established at transport level; i.e., terminal identifier is acquired from the connection request).

As per Claim 14 and 15, Yoshimoto teaches,

wherein the connection data is stored in the communication network (see *Fig. 6-7*; and for example, column 8, line 53 to column 9, line 34);

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and wherein the data to be transmitted is transmitted within a framework of a communication link via the subscriber's connection (see *Fig. 3 & 5; where the server processes connection request*) and the connection data is transmitted to the communication network on an establishment of the communication link (see *Fig. 2 & 4; where the server processes service request by acquiring terminal identifier*).

As per Claim 16, Yoshimoto teaches,

wherein the subscriber's connection is allocated to a switching device located in the communication network (see Fig. 4-5; and for example, column 7, line 10 to column 8, line 21; where a relay server; i.e., switching device, process requests by intercepting);

wherein the extracted connection data (see *Identifier Acquisition Module* in *Fig. 6-7*) is transmitted from the access network element to an authentication network element located in the communication network (see *Fig. 1*);

and wherein the data to be transmitted is verified by the authentication network element by using the connection data (see *AUTHENTICATION SERVER 104* in *Fig. 1*).

Yoshitomo fails to teach wherein the connection data is inserted as "Relay Session ID TAG" into the PPPoE Active Discovery messages; wherein the PPPoE Active Discovery messages which contains the connection data is transmitted to an access network element located in the communication network; and wherein the specific TAG value of the Relay Session ID TAG which represents the connection data contained in the messages is extracted in the access network element. However, Senapati teaches connection data is inserted as "Relay Session ID TAG" into the PPPoE Active Discovery messages through the switching device; wherein the specific TAG value of the Relay Session ID TAG which represents the connection data contained in the messages is extracted in the access network element (see *Modem 104* in *Fig. 1-2*; and for example, paragraphs [0063] to [0071]).

It would have been obvious to a person having ordinary skill in the art at the time of Applicant's invention to incorporate the PPPoE feature of Senapati in to the data transmission method of Yoshimoto in order to improve the data transmission process of DSL service (see Background of Senapati).

As per Claims 17 and 18, Yoshimoto teaches,

wherein the subscriber is connected to the communication network via the subscriber's connection (see *Fig. 1*) and authentication is verified by using the connection data and by using subscriber data which represents the subscriber (see *Fig. 2-5; where the terminal identifier information is used to authenticate process and connection requests from clients*);

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and wherein the subscriber data includes a user name and a password (see steps S202, S302, S401 and S501 in Fig. 2-5; where user identifier is acquired).

As per Claim 20, 24 and 26, Yoshimoto teaches,

wherein the subscriber's connecting line is a wire connecting line through which the subscriber is physically connected to the communication network (see *network cable 101 in Fig. 1*; where clients 103, 105 & 106 are connected to the verifying server 104 and server 102);

and wherein the subscriber's connection and the transmitter are allocated to a switching device located in the communication network (see *Fig. 1* and *4-5*; and for example, column 7, line 10 to column 8, line 21; where a relay server; i.e., switching device, process requests by intercepting).

Conclusion

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. (See PTO-892).

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Any inquiry concerning this communication or earlier communications from the examiner should

be directed to Amare Tabor whose telephone number is (571) 270-3155. The examiner can normally be

reached on Mon-Fri 7:30a.m. to 5:00p.m., EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ayaz

Sheikh can be reached on (571) 272-3795. The fax phone number for the organization where this

application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application

Information Retrieval (PAIR) system. Status information for published applications may be obtained from

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Amare Tabor AU 2139